LIGHTMOODS™

Single Color TOP View LED Neon Ribbon Light

USER MANUAL
TOPSCO-24V-108
(Red/Orange/Amber)

PLEASE READ THESE INSTRUCTIONS CAREFULLY BEFORE INSTALLATION AND LEAVE A COPY FOR THE END USER/MAINTENANCE ENGINEER FOR FUTURE REFERENCE

FEATURES

1. Model: TOPSCO-24V-108
2. Rated input voltage: DC 24V
3. Rated Power: 7.2W/m
4. Dimension: 16*16mm
5. LED quantity: 108 LEDs/mtr
6. LED Spacing: 9.3mm
7. Min. cutting length: 83.3mm(9LEDs)
8. Max. running length for integral connector:
15 mtrs for single end feed or 30mtrs for double end feed.
Max. running length for DIY connector:
15 mtrs for single end feed or 30mtrs for double end feed.
9. Light color: Single Color (Red/Orange/Amber)
10. Min. bent diameter: 300mm. Do not twist the light.
11. Protection rate: IP68
12. Protection rate for IP68: Protected against dust and submersion in water (1meter above).
NOTE: All connector joints must be connected correctly to achieve IP68 rating
13. Can be cut and extended(Only applicable to DIY accessories)
14. Long lifetime: 5 years
15.Working ambient temperature: -4°~113°F (-20°~45°C)
16.Operating (bending) ambient temperature: 32°~113°F (0°~45°C)

ACCESSORIES (SOLD SEPARATELY)

IP68 Clasp Type Accessories Kit

Single End Connection Application Accessories Kit

Clasp Front Connector Accessories Kit

01 (or 02) Front Connector	1 pc
Silicon Gasket	1 pc
U Steel Plate	1 pc
Anti-skidding Clip	1 pc

Clasp End Cap Accessories Kit

The Tail Plug	1pc
U Steel Plate	1pc
Anti-skidding Clip	1pc
Silicon Gasket	1pc

WARNING AND CAUTION

WARNING

1. Before making any cuts,installation,maintenance or connection, be sure the mains is disconnected!
2. NOTE: ALL CONNECTOR JOINTS MUST BE CONNECTED CORRECTLY TO ACHIEVE IP68 RATING.
3. Please operate this flex light according to the instructions, and confirm the work voltage, it must be matched with product requirements.
4. Please confirm the polarity of connector before insertion front connection cable.
5. Connect and cut this product correctly. Any wrong operation will damage this product.
6. No pressing on this product during storage, long term pressing may lead to damage.
7. Using qualified DC power supply.
8. Min. bent diameter 300mm, see Fig.1.
9. Do not twist the light as Fig.2 and follow the correct bending direction as Fig.3.
10. Do not hang this light in the air as Fig.4.
11. Cutting at the wrong location will result in a failure of the light! See Fig.5.

CAUTION

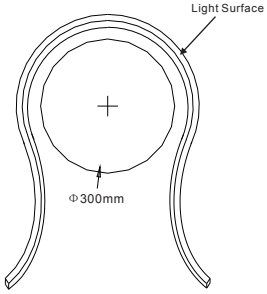
1. Suitable for mounting on normally flammable surfaces..
2. Use only factory-recommended connectors and accessories.
3. To ensure its long life span, operate the light properly in accordance with the instructions.
4. Do not operate in more than 113°F (45°C) ambient temperature.
5. Assemble the DIY Connector correctly as in Fig.6.
6. Max. running length depends on the energizing way as Fig.7 shown.
7. Warm White,Cool White and Daylight color reference ANSI STANDARD.
8. Do not operate light when ambient temperature is below 32°F (0°C) thais may injure the light .

ASSEMBLY AND INSTALLATION

1. Turn off the electricity before operation.
2. Cut the light at correct location (if need).
3. Assemble the light according to Fig.8.
4. Install U channel and light according to Fig.9 (Only applicable to DIY accessories) .
5. Wire all connectors to the power line and check wiring of the whole circuit.
Cable color coding basics Refer to Fig.10.

FIGURES

Fig. 1 Minimum bent diameter 300mm



DO-160G tested

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Twisting the light is forbidden and observe to correct bending orientation

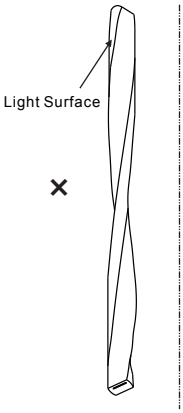


Fig. 2

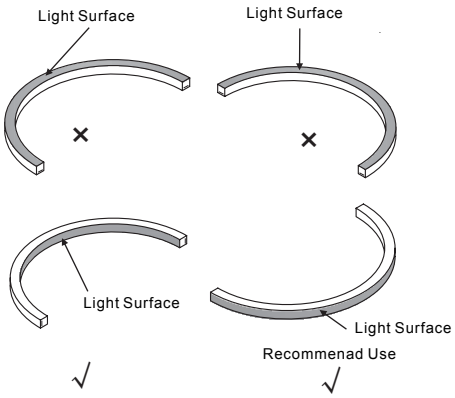


Fig. 3

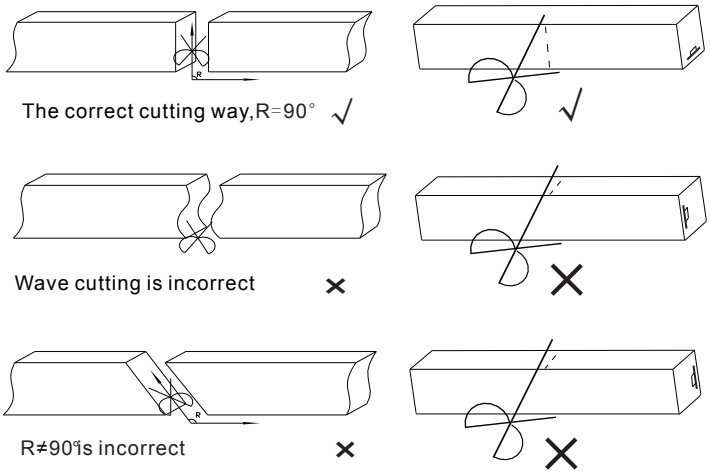


Fig. 4 Installation of the light hanging suspended in the air as the picture illustrates is forbidden.

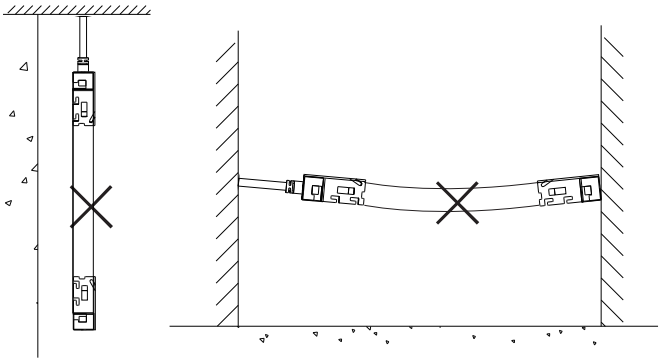


Fig. 5 Unit cutting guide(Only applicable to DIY accessories)

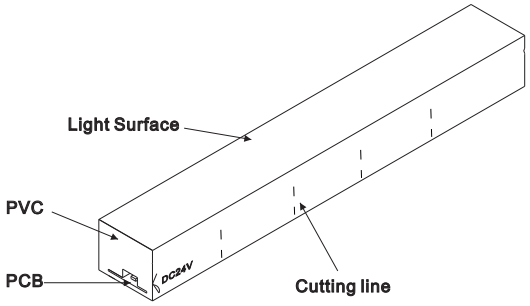
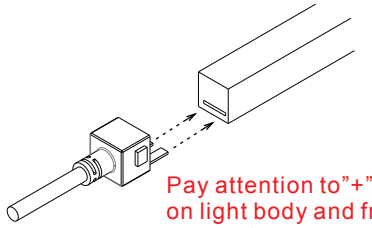


Fig.6 Correct insertion of connector pins
(Only applicable to DIY accessories)



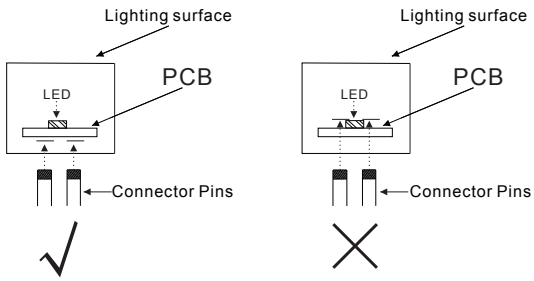
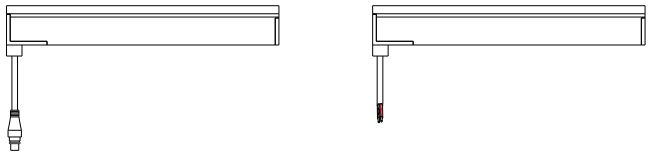


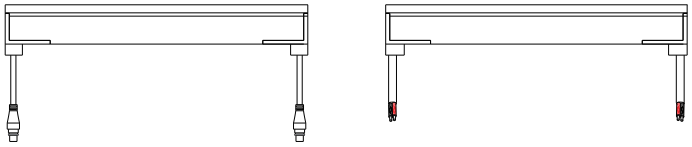
Fig.7 Energizing Method

① For integral connector:

Single ends connection for Max. length 5m

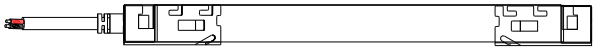


Double ends connection for Max. length 10m



② For DIY connector:

Single ends connection for Max. length 15m



Double ends connection for Max. length 30m

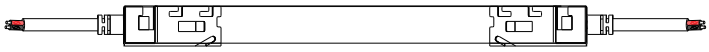
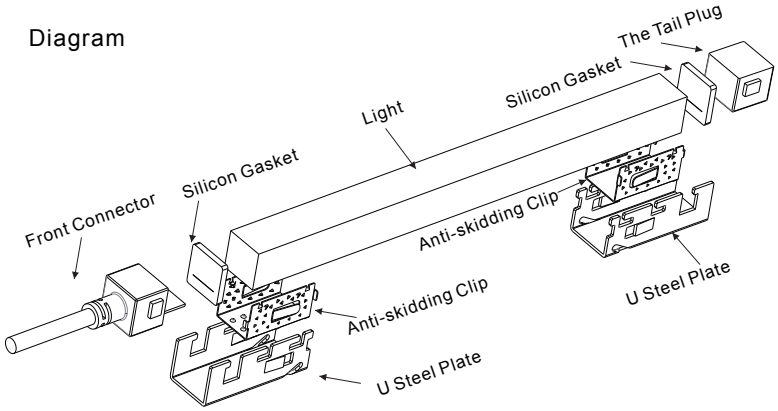
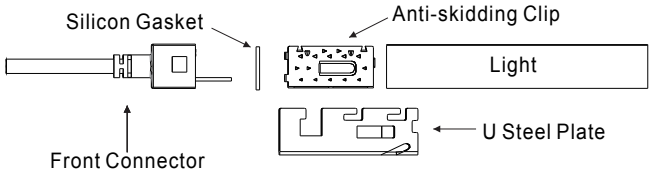


Fig. 8 IP68 Clasp Type Connector Assemble

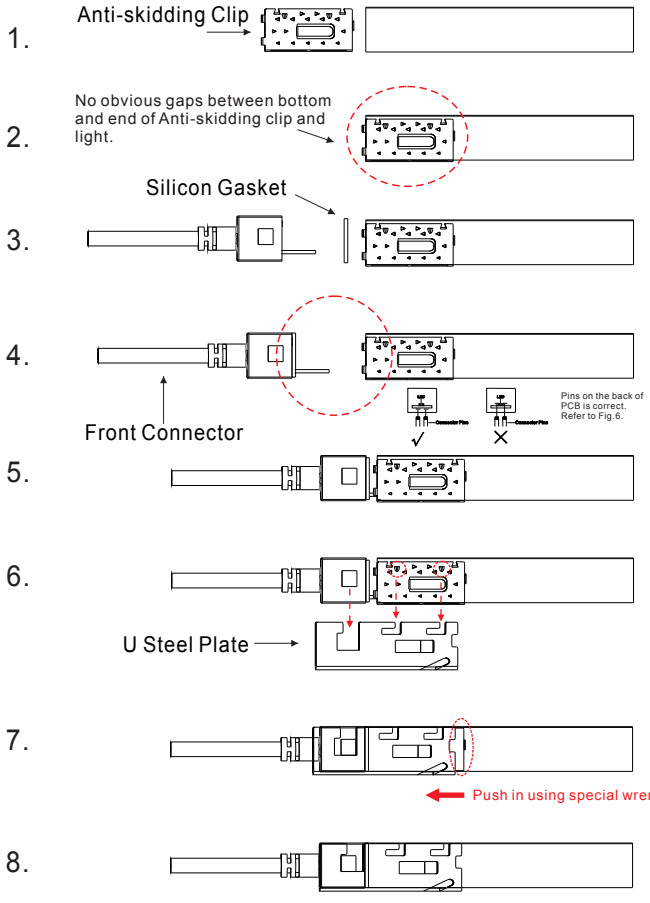
Diagram



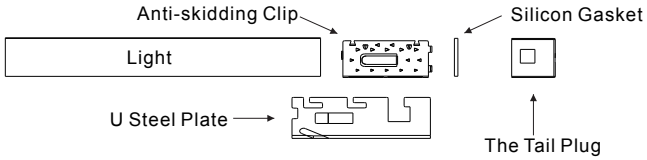
① Clasp Front Connector Assemble Diagram



Step



② Clasp End Cap Connector Assemble Diagram



Step

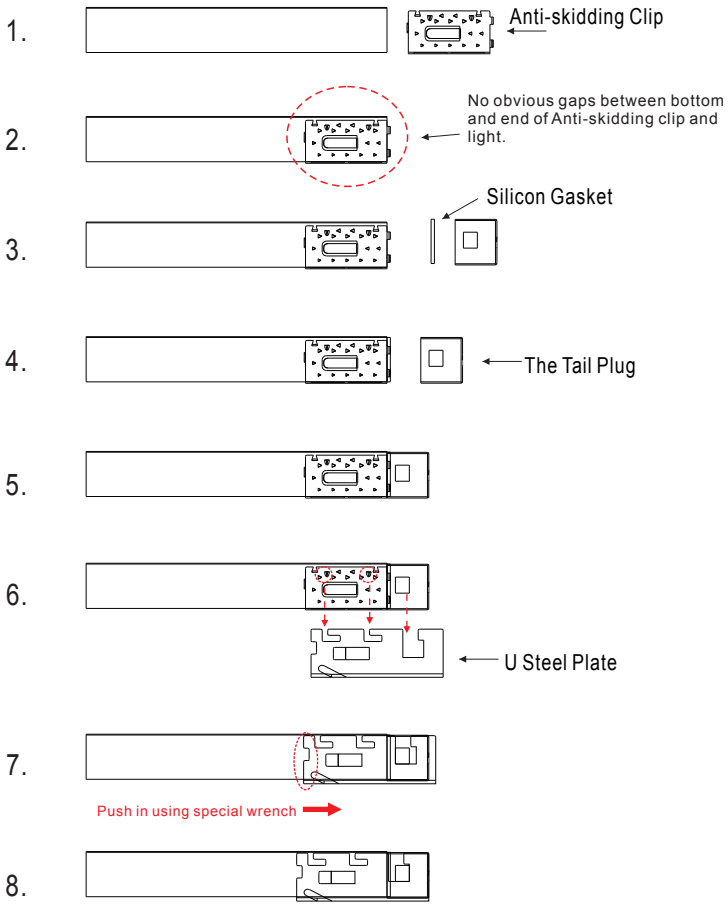


Fig. 9 Installation Guide

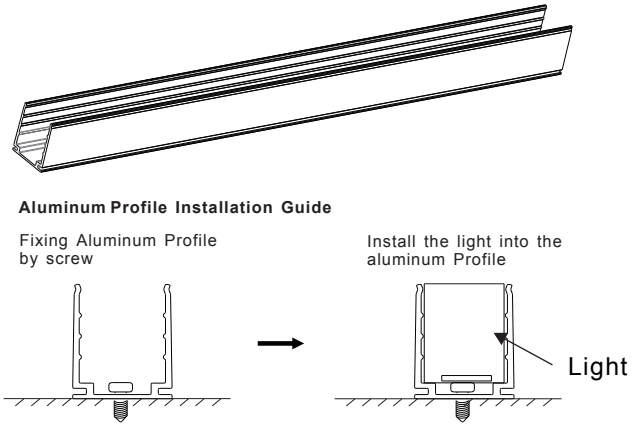
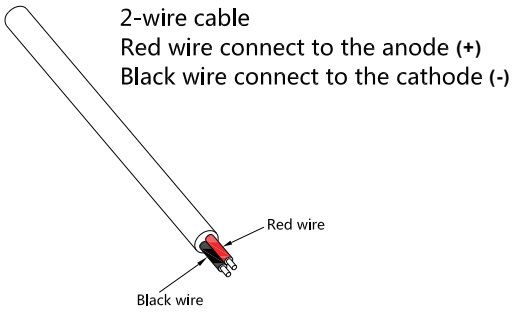

Aluminum Profile Installation Guide
Fixing Aluminum Profile by screw
Install the light into the aluminum Profile
Light

Fig. 10 Cable color coding basics



ANSI STANDARD

Nominal CCT Categories

Nominal CCT	Target CCT and tolerance(K)	Target Duv and tolerance
2700K	2725 ± 145	0.000 ± 0.006
3000K	3045 ± 175	0.000 ± 0.006
3500K	3465 ± 245	0.000 ± 0.006
4000K	3985 ± 275	0.001 ± 0.006
4500K	4503 ± 243	0.001 ± 0.006
5000K	5028 ± 283	0.002 ± 0.006
5700K	5665 ± 355	0.002 ± 0.006
6500K	6530 ± 510	0.003 ± 0.006
Flexible CCT (2700-6500K)	$T^2+\Delta T^3$	$D_{uv}T^2 \pm 0.006$

Remarks:

1. Six of the nominal CCTs correspond to those in the fluorescent lamp specification [2]:2700K,3000K(Warm White),3500K(White),4100K(Cool White),5000K and 6500K(Daylight),respectively.
2. T is chosen to be at 100K steps (2800,2900,⋯,6400K), excluding, hose eight nominal CCTs listed in Table 1.
3. ΔT is given by $\Delta T = 0.0000108 \times T^2 + 0.0262 \times T + 8$.
4. Duv is given by $Duv = 57700 \times (1/T)2 - 44.6 \times (1/T) + 0.0085$

GUARANTEE

1. We provide lifelong technical assistance with this product:
A 3 year warranty is given from the date of original purchase.
The warranty is for free repair or replacement and covers manufacturing faults only.
For faults beyond the 3 year warranty we reserve the right to charge for time and parts.
Current technology will be selected first for repair or replacement.
2. Warranty excludes below:
Any man-made damages caused from improper operation, assembly, wiring, connection, installation, transport and storage.
Improper input voltage, current, operating and working environment.
The product appears to have excessive physical damage.
Damage due to natural disasters and force majeure.
Product label or data code have been damaged.
3. Repair or replacement as provided under this warranty is the exclusive remedy to the customer.
We shall not be liable for any incidental or consequential damages for breach of any stipulation in this warranty.
4. Any amendment or adjustment to this warranty must be approved in writing by us only.
5. This manual only applies to this model. We reserves the right to modify the manual and keep the right to make final edition of this manual.